

AMENDMENTS TO THE CLAIMS

1. (Currently Amended) A direct drive motor in a washing machine comprising:
a stator ~~14~~ stator having a winding portion with coils wound thereon;
a ~~rotor 13~~ rotor fixedly connected to a washing shaft ~~4~~ shaft for direct drive of a drum,
the ~~rotor 13~~ rotor having a ~~sidewall 13b~~ sidewall, and a rear wall ~~13a~~ wall with a pass through
hole ~~131~~ hole at a center; and

a ~~connector 16~~ connector of a material having a vibration mode different from the
washing shaft, insert molded at the center of the rear wall ~~13a~~ wall of the rotor to form one body
with the rotor, and fixedly connected to the washing shaft to connect the rotor to the washing
shaft, and support the washing shaft ~~shaft~~ shaft.

wherein the rotor has a bonding piece for enhancing bonding forces between the
connector and the rotor at the time of insert molding of the connector.

2. (Currently Amended) The direct drive motor as claimed in claim 1, wherein the ~~rotor 13~~ rotor
is constructed of steel plate by pressing to form the side wall ~~13b~~ wall and the rear wall
~~13a~~ wall as one body.

3. (Currently Amended) The direct drive motor as claimed in claim 2, wherein the pass
through hole ~~131~~ hole at a center of the rear wall ~~13a~~ wall of the ~~rotor 13~~ rotor is formed at a
center of a hub ~~132~~ hub which is a portion projected in a stator side or in a direction opposite
thereto with respect to neighboring surface.

4. (Currently Amended) The direct drive motor as claimed in claim 3, wherein the
washing shaft ~~4~~ shaft is formed of metal, and the ~~connector 16~~ connector is formed of resin
which insulates between the washing shaft ~~4~~ shaft and the ~~rotor 4~~ rotor.

5. (Currently Amended) The direct drive motor as claimed in claim 4, wherein the
~~connector 16~~ connector includes a ~~serration 164~~ serration on an inside circumferential surface

having a shape in conformity with a shape of a ~~seriation 400~~seriation at a rear end portion of the washing ~~shaft 4~~shaft.

6. (Currently Amended) The direct drive motor as claimed in claim 5, wherein the ~~connector 16~~connector further includes reinforcing ~~ribs 161~~ribs for reinforcing a strength of the connector 16connector.

7. (Currently Amended) The direct drive motor as claimed in claim 4, wherein the rotor ~~13~~rotor includes at least one communication hole in a neighborhood of the pass through ~~hole 131~~hole for enhancing bonding force between the ~~connector 16~~connector of resin and the rotorrotor at the time of insert molding of the connector.

8. (Currently Amended) The direct drive motor as claimed in claim 7, wherein the ~~connector 16~~connector is insert molded in the rotor such that the ~~connector 16~~connector covers an inside of the pass through ~~hole 131~~hole and front and rear surfaces of neighborhood of the pass through ~~hole 131~~hole of the rotor.

9. (Currently Amended) The direct drive motor as claimed in claim 7, wherein the pass through ~~hole 131~~hole in the rotor ~~13~~rotor ~~has a bonding piece 210~~has the bonding piece projected in a length direction of the washing ~~shaft 4~~shaft for enhancing the bonding forces ~~force~~ between the ~~connector 16~~connector of resin and the ~~rotor 13~~rotor at the time of insert molding of the connector.

10. (Currently Amended) The direct drive motor as claimed in claim 4, wherein the rear ~~wall 13b~~wall has at least one bonding piece ~~211~~the bonding piece around the pass through ~~hole 131~~hole in the rotor ~~13~~rotor, the bonding piece projected in a length direction of the washing ~~shaft 4~~shaft for enhancing the bonding forces ~~force~~ between the ~~connector 16~~connector of resin and the rotor ~~13~~rotor at the time of insert molding of the connector.

11. (Currently Amended) A direct drive motor in a washing machine comprising:
a ~~stator 14~~stator having a winding portion with coils wound thereon;
a ~~rotor 13~~rotor fixedly connected to a washing ~~shaft 4~~shaft for direct drive of a drum,
the ~~rotor 13~~rotor having a ~~sidewall 13b~~sidewall, and a rear wall ~~13a~~wall formed as one body by
pressing steel plate, with communication holes in the rear wall and a pass through hole 131~~hole~~
at a center of the rear ~~wall 13a~~wall; and
a ~~connector 16~~connector of resin insert molded such that the ~~connector 16~~connector is
bonded on inner, and outer sides of the rear ~~wall 13a~~wall of the rotor including the
communication ~~holes 137~~holes therein to form one body with the rotor, and fixedly connected to
the washing shaft to connect the rotor to the washing shaft, and support the washing ~~shaft~~shaft,
wherein the rotor has a bonding piece for enhancing bonding forces between the
connector and the rotor at the time of insert molding of the connector.

12. (Currently Amended) The direct drive motor as claimed in claim 11, wherein the
washing ~~shaft 4~~shaft is formed of metal, and the ~~connector 16~~connector is formed of resin
which insulates between the washing ~~shaft 4~~shaft and the ~~rotor 4~~shaft and the rotor.

13. (Currently Amended) The direct drive motor as claimed in claim 12, wherein the
~~connector 16~~connector includes a ~~serration 164~~serration on an inside circumferential surface
having a shape in conformity with a shape of a ~~serration 400~~serration at a rear end portion of the
washing ~~shaft 4~~shaft.

14. (Currently Amended) The direct drive motor as claimed in ~~claim 6~~claim 13, wherein
the ~~connector 16~~connector further includes reinforcing ~~ribs 161~~ribs for reinforcing a strength of
the ~~connector 16~~connector.

15. (Currently Amended) The direct drive motor as claimed in claim 11, wherein the
~~rotor 13~~rotor includes at least one communication hole in a neighborhood of the pass through
~~hole 131~~hole for enhancing bonding force between the ~~connector 16~~connector of resin and the
rotor, rotor at the time of insert molding of the connector.

16. (Currently Amended) The direct drive motor as claimed in claim 11, wherein the pass through ~~hole 131-hole~~ in the ~~rotor 13-rotor~~ has a ~~bonding piece 210-the bonding piece~~ projected in a length direction of the washing shaft ~~4-shaft~~ for enhancing ~~the bonding force-forces~~ between the ~~connector 16-connector~~ of resin and the ~~rotor 13-rotor, at the time of insert molding of the connector.~~

17. (Currently Amended) The direct drive motor as claimed in claim 11, wherein the rear wall ~~13b-wall~~ has ~~at least one bonding piece 211-the bonding piece~~ around the pass through ~~hole 131-hole~~ in the ~~rotor 13-rotor, the bonding piece~~ projected in a length direction of the washing shaft ~~4-shaft~~ for enhancing ~~the bonding force-forces~~ between the ~~connector 16-connector~~ of resin and the ~~rotor 13-rotor, at the time of insert molding of the connector.~~

18. (Currently Amended) A direct drive motor in a washing machine comprising:
a stator ~~14-stator~~ having a winding portion with coils wound thereon;
a ~~rotor 13-rotor~~ of magnetic metal fixedly connected to a washing shaft ~~4-shaft~~ of metal for direct drive of a drum, the ~~rotor 13-rotor~~ having a ~~sidewall 13b sidewall~~, and a rear wall ~~13a wall~~ with a pass through ~~hole 131-hole~~ at a center; and
a ~~connector 16-connector~~ of resin for insulating between the washing shaft and the rotor, insert molded at the center of the rear wall ~~13a-wall~~ of the ~~rotor 16-rotor~~ to form one body with the rotor, and ~~connect-connecting~~ the washing shaft to the ~~rotor-rotor~~,
wherein the rotor has a bonding piece for enhancing bonding forces between the connector and the rotor at the time of insert molding of the connector.

19. (Currently Amended) The direct drive motor as claimed in claim 18, wherein the ~~rotor 13-rotor~~ includes at least one communication hole in a neighborhood of the pass through ~~hole 131-hole~~ for enhancing ~~the bonding force-forces~~ between the ~~connector 16-connector~~ of resin and the ~~rotor-rotor at the time of insert molding of the connector.~~

20. (Currently Amended) The direct drive motor as claimed in claim 19, wherein the ~~connector-16~~connector is insert molded in the rotor such that the ~~connector-16~~connector covers an inside of the pass through ~~hole-131~~hole and front and rear surfaces of neighborhood of the pass through ~~hole-131~~hole of the rotor.